

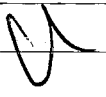
# Work Order ID 120882

June-12-14 12:47:57 PM

**\*120882\***

Page 1

Item ID: D4353-041 Accept **\*N900040100\*** Setup Start **\*NS1\***  
 Revision ID: ? Stop **\*NS2\***  
 Item Name: Bearpaw Assembly  
 Start Date: 6/12/14 Start Qty: 4.00 **\*4\*** Cust Item ID:  
 Required Date: 6/20/14 Req'd Qty: 4.00 **\*4\*** Customer:  
 Reference:

Approvals: Process Plan:  Date: \_\_\_\_\_ Tooling: \_\_\_\_\_ Date: \_\_\_\_\_ Run Start **\*NR1\***  
 QC: \_\_\_\_\_ Date: \_\_\_\_\_ SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_ Stop **\*NR2\***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
Draw Nbr	Revision Nbr								
D4353	B								

105

0.00

**\*105\***

Purchasing

Purchasing

Memo

ISSUE PO 24591  
 Cut Blank as per D4353-1 File

0.00

CL 14/06/13 4

115

Receive & Inspect for Damage & Mat'l Certs

0.00

**\*115\***

Packaging

Packaging

Memo

0.00

4x SP 14-626

125

QC6- Inspect dimensions to drawing

0.00

**\*125\***

QC

Quality Control

Memo

0.00

CL 14/07/19 5

# Work Order ID 120882

June-12-14 12:47:57 PM

**\*120882\***

Page 2

Item ID: D4353-041 Accept **\*N900040100\*** Setup Start **\*NS1\***  
Revision ID: Stop **\*NS2\***  
Item Name: Bearpaw Assembly  
Start Date: 6/12/14 Start Qty: 4.00 **\*4\*** Cust Item ID:  
Required Date: 6/20/14 Req'd Qty: 4.00 **\*4\*** Customer:  
Reference:

Approvals: Process Plan: \_\_\_\_\_ Date: \_\_\_\_\_ Tooling: \_\_\_\_\_ Date: \_\_\_\_\_ Run Start **\*NR1\***  
QC: \_\_\_\_\_ Date: \_\_\_\_\_ SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_ Stop **\*NR2\***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
130	HAAS CNC VERTICAL MACHINING #1	0.00				4	<del>1</del>		
<b>*130*</b>									
HAAS 1	Memo	0.00							
HAAS CNC vertical machine #1	1-Inspect material for defects or damage prior to machining 2-Machine as per FolioFB050 and Dwg FOLIO REV: <u>AA</u> DWG REV: <u>B</u> 3-Deburr								
140	QC2- Inspect parts off machine FAI/FAIB	0.00				4	<del>1</del>		
<b>*140*</b>									
QC	Memo	0.00							
Quality Control									
150	QC8- Inspect parts - second check	0.00				4	<del>1</del>		
<b>*150*</b>									
QC	Memo	0.00							
Quality Control									

B.A 14/07/17

B.A 14/07/18

OK 14/07/20

PT 07

DQA:

Date: 14/08/01



## WORK ORDER NON-CONFORMANCE / UPDATE

QA Closed:

Date: 14/7/28

Work Order update only ☐

Work Order: <u>120882</u>	<b>DISPOSITION</b> Rework <input type="checkbox"/> Scrap <input checked="" type="checkbox"/> Use-as-is <input type="checkbox"/> Suspected Unapproved <input type="checkbox"/>	<b>AGAINST DEPARTMENT/PROCESS</b>			
Part No. <u>D4353-041</u>		Skid-tube <input type="checkbox"/>	Crosstube <input type="checkbox"/>	Water Jet <input type="checkbox"/>	Engineering <input type="checkbox"/>
NCR No. <u>1A-4066</u>		Machining <input checked="" type="checkbox"/>	Small Fab <input type="checkbox"/>	Prod. Eng. Coord. <input type="checkbox"/>	Quality <input type="checkbox"/>
		Thermoforming <input type="checkbox"/>	Finishing <input type="checkbox"/>	Rec/Store/Packaging <input type="checkbox"/>	Other <input type="checkbox"/>
		Large Fab <input type="checkbox"/>	Composite <input type="checkbox"/>	Supplier <input type="checkbox"/>	

Root Cause	Date	Step	Qty	Description of work order update or non-conformance	Initial Chief Eng	Action Description	Sign & Date	Verification	QC Inspector
Design									
Doc/Data									
Equip/Tooling									
Handling/Pre									
Material									
Operator									
Offset/Setup									
Process									
Supplier									
Training									
Transport									
Unapproved									

## FAULT CATEGORY

<b>Landing Gear</b> <input type="checkbox"/> Bending <input type="checkbox"/> Centre Not Concentric <input type="checkbox"/> Cracks <input type="checkbox"/> Crimp/Kink/Ripple/Wave <input type="checkbox"/> Cuffs <input type="checkbox"/> Crushing <input type="checkbox"/> Heat Treat <input type="checkbox"/> Inspection Strip in Tube <input type="checkbox"/> Marks/Chatter <input type="checkbox"/> Turning Sequence <input type="checkbox"/> Wave/Twist in Tube	<b>General</b> <input type="checkbox"/> Bend <input type="checkbox"/> BOM/Route <input type="checkbox"/> Broken/Damage/Defect <input type="checkbox"/> Burrs <input type="checkbox"/> Contamination <input type="checkbox"/> Countersink <input type="checkbox"/> Cut Too Short <input type="checkbox"/> Drawing <input type="checkbox"/> Drill Holes <input type="checkbox"/> Finish <input type="checkbox"/> Fit/Function	<input checked="" type="checkbox"/> Folio/Program <input type="checkbox"/> Grain <input type="checkbox"/> Hardware <input type="checkbox"/> Inspection Incomplete/Unqualified <input type="checkbox"/> Instructions Incomplete/Unclear <input type="checkbox"/> Misaligned/off center <input type="checkbox"/> Mislabeled <input type="checkbox"/> Misread <input type="checkbox"/> Off-set <input type="checkbox"/> Out of Calibration <input type="checkbox"/> Out of Sequence	<input type="checkbox"/> Outside Dimensions <input type="checkbox"/> Over/Under tolerance <input type="checkbox"/> Part Incorrect <input type="checkbox"/> Part Lost/Missing <input type="checkbox"/> Part Moved <input type="checkbox"/> Positioned Wrong <input type="checkbox"/> Power Loss/Surge	<input type="checkbox"/> Pressure/Forced <input type="checkbox"/> Set-up <input type="checkbox"/> Temperature/Cure <input type="checkbox"/> Weld <input type="checkbox"/> Wrong Stock Pulled <input type="checkbox"/> Other
--	--	--	--	--

June-12-14 12:47:57 PM

**\*120882\***

Page 3

**Accept**

**\*N900040100\***

Setup Start \*NS1\*

Stop \*NS2\*

**Start Date:** 6/12/14      **Start Qty:** 4.00      **\*4\***

**Cust Item ID:**

**Required Date:** 6/20/14      **Req'd Qty:** 4.00      **\*/\***

**Customer:**

**Reference:**

**Approvals:**      **Process Plan:** \_\_\_\_\_ **Date:** \_\_\_\_\_ **Tooling:** \_\_\_\_\_ **Date:** \_\_\_\_\_

Run Start \*NR1\*

QC: \_\_\_\_\_ Date: \_\_\_\_\_ SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_

Stop **\*NR2\***

### Set Up/ Run Hours

**Tool ID****Tool #****Plan  
Code**

**Accept  
Qty**

Reject  
QtyReject  
Number

**Insp.**  
**Stamp**

152

## Pick Kit

0.00

**\*152\***

## Packaging

## Memo

0.00

## Packaging

153

0.00

**\*153\***

Small Fab

## Memo

0.00

## Small Fab

PRESS D4353-3 INSERT INTO BEARPAW

154

QC5- Inspect part completeness to step on W/O

0.00

**\*154\***

QC

## Memo

0.00

### Quality Control

# Work Order ID 120882

June-12-14 12:47:57 PM

**\*120882\***

Page 4

Item ID: D4353-041 Accept **\*N900040100\*** Setup Start **\*NS1\***  
 Revision ID: Stop **\*NS2\***  
 Item Name: Bearpaw Assembly  
 Start Date: 6/12/14 Start Qty: 4.00 **\*4\*** Cust Item ID:  
 Required Date: 6/20/14 Req'd Qty: 4.00 **\*4\*** Customer:  
 Reference:

Approvals: Process Plan: \_\_\_\_\_ Date: \_\_\_\_\_ Tooling: \_\_\_\_\_ Date: \_\_\_\_\_ Run Start **\*NR1\***  
 QC: \_\_\_\_\_ Date: \_\_\_\_\_ SPC (Y/N): \_\_\_\_\_ Date: \_\_\_\_\_ Stop **\*NR2\***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
155	Identify as per dwg & Stock Location: _____	0.00							DAB 28 9-89
<b>*155*</b>									
Packaging	Memo	0.00							
Packaging	PPP 2x 121020 2x 120266								
190	QC21- Final Inspection - Work Order Release	0.00							
<b>*190*</b>									
QC	Memo	0.00							
Quality Control									

4X. 14-7-21

14/7/22 DJ  
ML5 14-07-21

# Picklist Print

June-12-14 12:47:57 PM

Page 1

Work Order ID: 120882

**\*120882\***

Parent Item: D4353-041

**\*D4353-041\***

Parent Item Name: Bearpaw Assembly

Start Date: 6/12/14

Required Date: 6/20/14

Start Qty: 4.00

Required Qty: 4.00

Comments: IPP REV:A NEW ISSUE 11-04-12 JLM VERIFIED BY:DD

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Qty per Kit	Total Qty	Qty Issued	Date Issued	Status
MUHMWB10		Purchased	No				sf	773.3000		26			

**\*MUHMWB10\***

UHMW 1" Black - 48"x120" Tivar Mfg.#52480104

**\*\***

CL 14/06/14

Location	Loc Qty	Loc Code
MAT	400	
m129293	400	
MAT018	373.3	
m128267	47	
m128668	326.3	

13

13

D4353-3

Manufactured No

Each 1.0000

4

**\*D4353-3\***

Bearpaw Insert

**\*\***

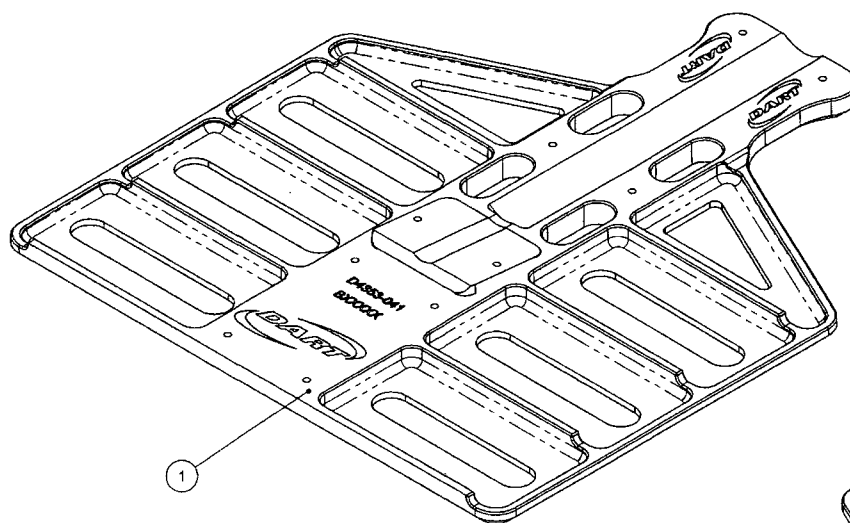
FF 14-07-21

Location	Loc Qty	Loc Code
ST104	1	
70727	1	

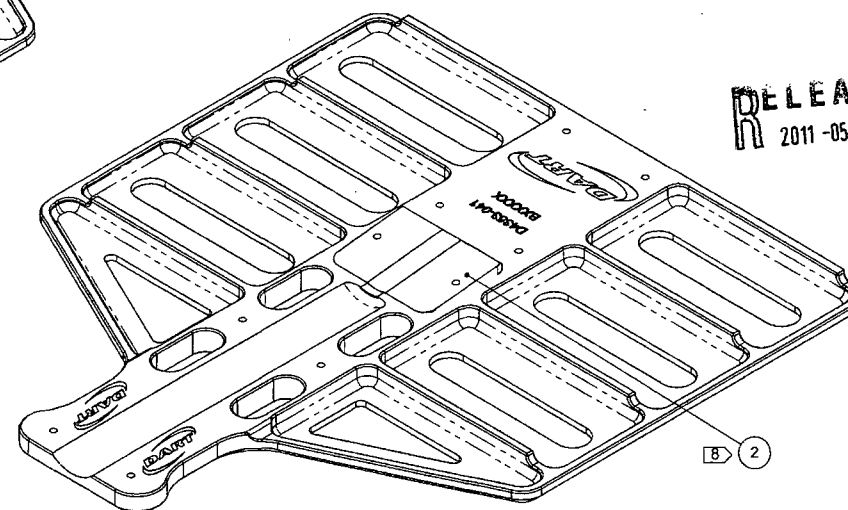
121182

4

ITEM	QTY	P/N	DESCRIPTION
	X	D4353-041	429 BEARPAW ASSEMBLY
1	1	D4353-1	429 BEARPAW
2	1	D4353-3	429 BEARPAW INSERT



**D4353-041 429 BEARPAW ASSEMBLY**



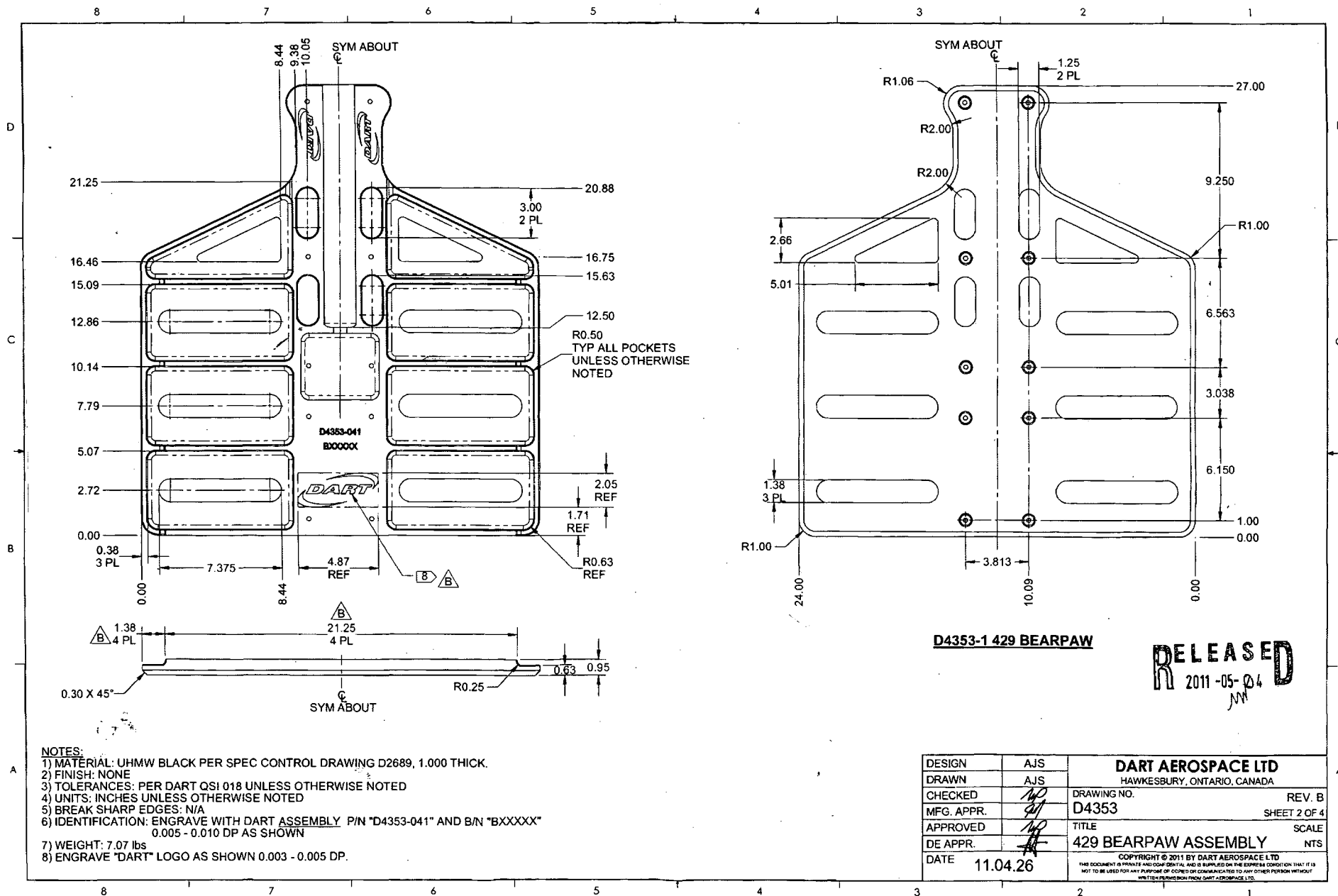
**RELEASED**  
2011-05-25  
MD

**NOTES:**

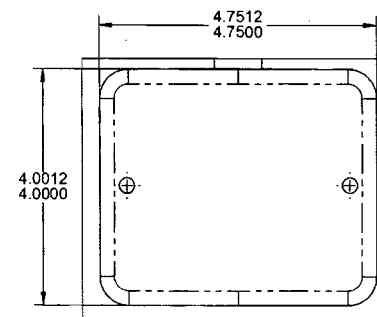
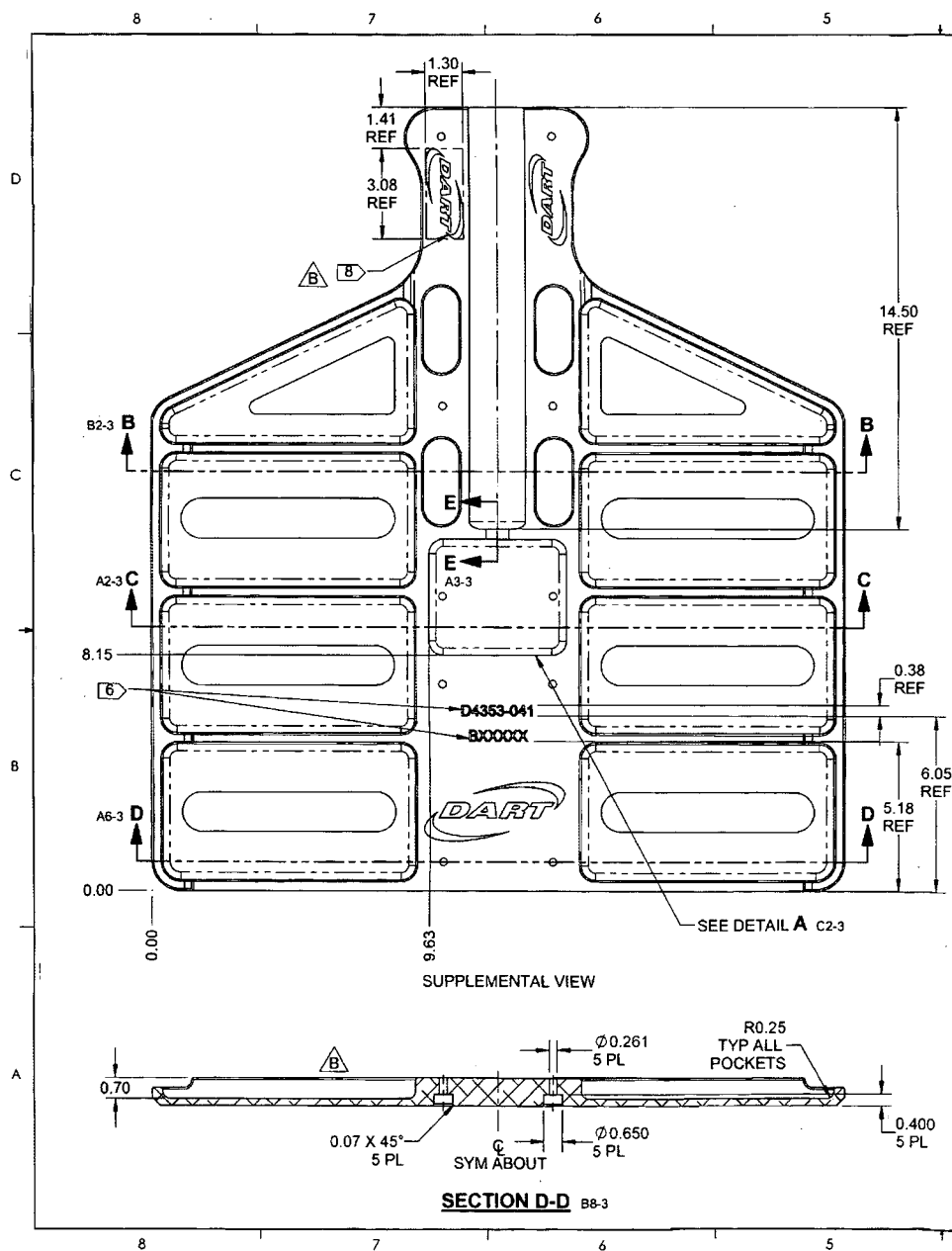
- 1) MATERIAL: N/A
- 2) FINISH: NONE
- 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED
- 5) BREAK SHARP EDGES: N/A
- 6) IDENTIFICATION: N/A
- 7) WEIGHT: 7.45 lbs
- 8) PRESS FIT



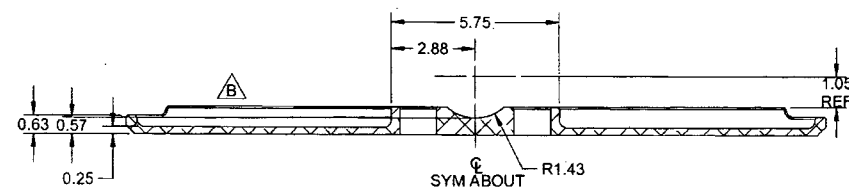
B	SHT 1 WEIGHT CORRECTED WAS 8.24 lbs. SHTS 1-3 DART LOGOS UPDATED. SHT 2, ZONE B8, AFT POCKET REDUCED. RIB INCREASED IN HEIGHT. SHT 3 SECTS. B,C & D RIB INCREASED IN HEIGHT.	AJS	11.04.26
A	NEW ISSUE	AJS	11.03.24
REV.	DESCRIPTION	BY	DATE
DESIGN	AJS	<b>DART AEROSPACE LTD</b> HAWKESBURY, ONTARIO, CANADA	
DRAWN	AJS		
CHECKED	MD	DRAWING NO.	REV. B
MFG. APPR.	MD	D4353	SHEET 1 OF 4
APPROVED	MD	TITLE	SCALE
DE APPR.	MD	429 BEARPAW ASSEMBLY	NTS
DATE	11.04.26	COPYRIGHT © 2011 BY DART AEROSPACE LTD THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD	



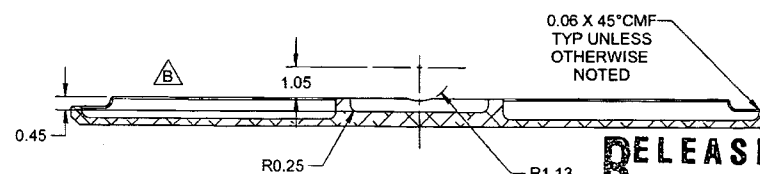




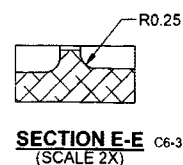
DETAIL A A5-3  
(SCALE 2X)



SECTION B-B C6-3

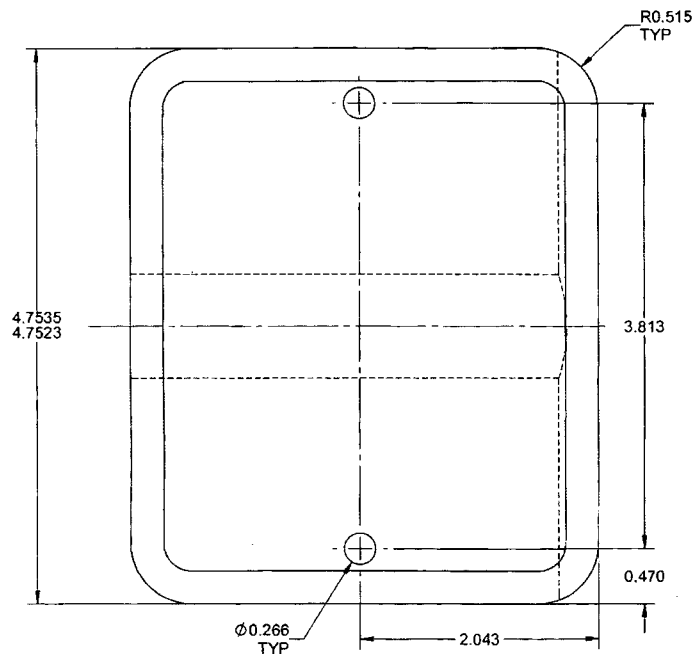
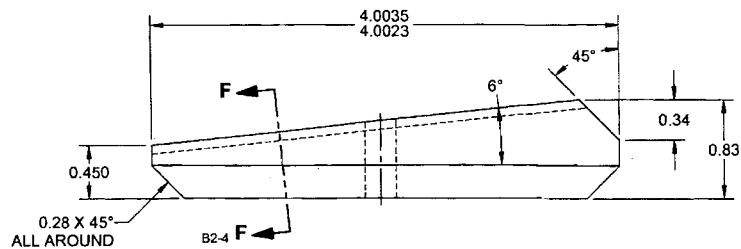


SECTION C-C C6-3

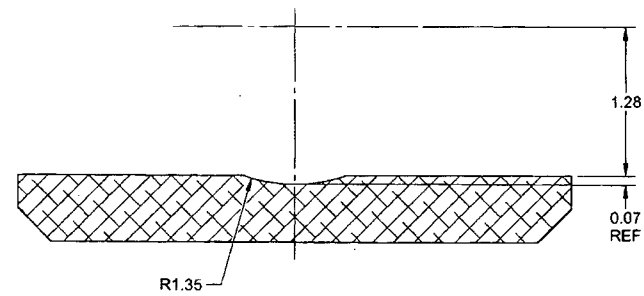
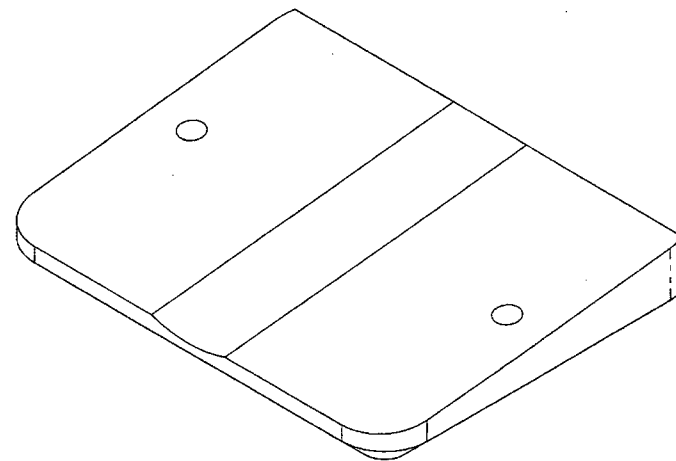


DESIGN	AJS	DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA	
DRAWN	AJS		
CHECKED	<i>[Signature]</i>	DRAWING NO. D4353	REV. B
MFG. APPR.	<i>[Signature]</i>	SHEET 3 OF 4	
APPROVED	<i>[Signature]</i>	TITLE	SCALE
DE APPR.	<i>[Signature]</i>	429 BEARPAW ASSEMBLY	NTS
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RELEASED  
2011-05-24  
JW



**D4353-3 429 BEARPAW INSERT**



**SECTION F-F C7-4**

**RELEASED**  
2011-05-27

**NOTES:**

- 1) MATERIAL: UHMW BLACK PER SPEC CONTROL DRAWING D2689, 1.000 THICK.
- 2) FINISH: NONE
- 3) TOLERANCES: PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED
- 5) BREAK SHARP EDGES: N/A
- 6) IDENTIFICATION: NONE
- 7) WEIGHT: 0.38 lbs

DESIGN	AJS	<b>DART AEROSPACE LTD</b>	
DRAWN	AJS	HAWKESBURY, ONTARIO, CANADA	
CHECKED	<i>[Signature]</i>	DRAWING NO.	REV. B
MFG. APPR.	<i>[Signature]</i>	D4353	SHEET 4 OF 4
APPROVED	<i>[Signature]</i>	TITLE	SCALE
DE APPR.	<i>[Signature]</i>	429 BEARPAW ASSEMBLY	NTS
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Dart Aerospace Ltd.  
1270 Aberdeen Street  
Hawkesbury, ON K6A 1K7  
Tel: 613 632 9577  
Fax: 613 632 1053

## PURCHASE ORDER

Purchase Order ID **PO24591**

Purchase Order Date 6/13/2014

PO Print Date 6/13/2014

Page Number 1 of 2

**Order From :**

VC-TPI001

TPI INDUSTRIES INC.  
148 RUE GOODFELLOW  
DELSON, QUEBEC J5B 1V4  
CANADA

**Ship To :** DART AEROSPACE LTD

1270 ABERDEEN  
HAWKESBURY, ON K6A 1K7  
CANADA

**PO24591**

**Contact Name**

**Vendor Phone** 450-633-0484

**Ship To Contact**

**Ship To Phone**

**Ship Via:** TST ground

**Ship Acct:**

**Buyer**

Chantal Lavoie

**Customer POID**

**Customer Tax #**

10127-2607

**Terms**

Net 30

**Currency**

CAD

**FOB**

Destination-Collect

Line Nbr	Reference Vendor Part Number Line Comments Delivery Comments	Description/ Mfg ID	Req Date/ Taxable Promise Date	CD	Req Qty/ Unit of Measure	PO Unit Price	Extended Price
1	120444  CUT AS PER DWG D2432 REV. H	D2432 BEARPAW	6/30/2014 Yes 6/30/2014		8.00 ✓	\$29.90	\$239.20
						<b>Line Total:</b>	<b>\$239.20</b>
2	120882  CUT AS PER DWG D4353 REV. B	D4353-041 BEARPAW	6/30/2014 Yes 6/30/2014		4.00 ✓	\$43.28	\$173.12
						<b>Line Total:</b>	<b>\$173.12</b>
3	71401-45  Quality Procurement Clauses A005 RIGHT OF ENTRY A016 PERSONNEL QUALIFICATION A042 DART NOTIFICATION BY SUPPLIER	PROCUREMENT QUALITY CLAUSES	6/30/2014 No 6/30/2014		1.00 ✓	\$0.00	\$0.00

Note:

6/13/2014

SP 14-6-26

**T.P.I. INDUSTRIES INC.**

148 GOODFELLOW  
DELSON, QUÉBEC J5B 1V4  
CANADA  
Tel: (450) 633-0484  
Fax: (450) 633-0879

**Packing Slip**

Packing Slip No.: 6161  
Date: 2014-06-25  
Page: 1

<b>Sold to:</b>	<b>Ship to:</b>
<b>Dart Aerospace</b> Michael Grégoire 1270 Aberdeen Hawkesbury, Ontario K6A 1K7 Canada	<b>Dart Aerospace</b> Michael Grégoire 1270 Aberdeen Hawkesbury, Ontario K6A 1K7 Canada
<b>Order No.:</b> 24591	<b>Sold By:</b> JONATHAN LESSARD
<b>Shipped By:</b>	<b>Ship Date:</b> 2014-06-25
<b>Tracking No.:</b>	

Item No.	Unit	Description	Quantity
d2432 d4353-041	Chaque Chaque	d2432 bearpaw d4353-041 bearpaw	8 4

SP 14-6-26.

**Comment:** Net / 30 from date of invoice 2% svc. chg. on invoices over 30 days

<b>DART AEROSPACE LTD</b>	<b>Work Order:</b> 120882
<b>Description:</b> D4353-1 (Bearpaw)	<b>Part Number:</b> D4353-1
<b>Inspection Dwg:</b> D4353 Rev: B	<b>Page 1 of 1</b>

### FIRST ARTICLE INSPECTION CHECKLIST

Drawing Dimension	Tolerance	Actual Dimension	Accept	Reject	Method of Inspection	Comments
1.375	+/- .010	1.377	✓		Vern	GA-13
1.38	+/- .030	1.376	✓		"	"
0.30x45°	+ .030 / +/- 1/2°	0.290x45°	✓		"	"
21.25	+/- .030	21.250	✓		Tape	GA-12
0.63	+/- .030	0.633	✓		Vern	GA-13
0.95	+/- .030	0.965	✓		"	"
1.38	+/- .030	1.375	✓		"	"
24.00	+/- .030	24.00	✓		Tape	GA-12
3.813	+/- .005	3.813	✓		Vern	CNC-02
1.00	+/- .030	1.005	✓		"	"
6.150	+/- .005	6.150	✓		"	"
3.038	+/- .005	3.038	✓		"	"
6.563	+/- .005	6.563	✓		"	"
9.250	+/- .005	9.250	✓		"	"
27.00	+/- .030	27.00	✓		Tape	GA-12
1.25	+/- .030	1.249	✓		Vern	GA-13
0.07x45°	+ .030 / +/- 1/2°	0.070x45°	✓		"	"
φ0.261	+ .006 / - .001	φ0.260	✓		"	"
φ0.650	+/- .010	φ0.649	✓		"	"
R0.25	+/- .030	R0.250	✓		R-6	ref.
0.400	+/- .010	0.402	✓		Vern	GA-13
0.45	+/- .030	0.459	✓		D-6	GA-06
R0.25	+/- .030	R0.250	✓		R-6	ref.

<b>Measured by:</b> J.A.	<b>Audited by:</b> [Signature]	<b>Preliminary Approval:</b>
<b>Date:</b> 14/07/18	<b>Date:</b> 14/07/20	<b>Date:</b>

Rev	Date	Change	Revised by	Approved
E	10.04.14	Added preliminary approval	KJ	-

10.04.15

## FIRST ARTICLE INSPECTION CHECKLIST

Rev	Date	Change	Revised by	Approved
E	10.04.14	Added preliminary approval	KJ	-